



SEQUENCE LISTING

<110> Ono Pharmaceutical Co., Ltd.

<120> A NOVEL POLYPEPTIDE, A CDNA ENCODING THE POLYPEPTIDE AND UTILIZATION THEREOF

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<140> 09/674,330

<141> 2000-10-30

<150> JP 10-119731

<151> 1998-04-28

<150> PCT/JP99/02283

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<170> PatentIn version 3.0

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Pro Pro Val Pro Ala Ser Asn Tyr Pro Thr Ile Ser Arg Pro Leu Val
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Ser	Asp	Met	Asp	Glu	Cys	Ser	Phe	Ser	Glu	Phe	Leu	Cys	Gln	His	Glu	
		225					230					235				
tgt	gtg	aac	cag	ccg	ggc	tca	tac	ttc	tgc	tcg	tgc	cct	cca	ggc	tac	1101
Cys	Val	Asn	Gln	Pro	Gly	Ser	Tyr	Phe	Cys	Ser	Cys	Pro	Pro	Gly	Tyr	
	240						245				250					
gtc	ctg	ttg	gat	gat	aac	cga	agc	tgc	cag	gat	atc	aat	gaa	tgt	gag	1149
Val	Leu	Leu	Asp	Asp	Asn	Arg	Ser	Cys	Gln	Asp	Ile	Asn	Glu	Cys	Glu	
255					260					265					270	
cac	cga	aac	cac	acg	tgt	acc	tca	ctg	cag	act	tgc	tac	aat	cta	caa	1197
His	Arg	Asn	His	Thr	Cys	Thr	Ser	Leu	Gln	Thr	Cys	Tyr	Asn	Leu	Gln	
				275					280					285		
ggg	ggc	ttc	aaa	tgt	att	gat	ccc	atc	agc	tgt	gag	gag	cct	tat	ctg	1245
Gly	Gly	Phe	Lys	Cys	Ile	Asp	Pro	Ile	Ser	Cys	Glu	Glu	Pro	Tyr	Leu	
			290					295					300			
ctg	att	ggg	gaa	aac	cgc	tgt	atg	tgt	cct	gct	gag	cac	acc	agc	tgc	1293
Leu	Ile	Gly	Glu	Asn	Arg	Cys	Met	Cys	Pro	Ala	Glu	His	Thr	Ser	Cys	
		305					310					315				
aga	gac	cag	cca	ttc	acc	atc	ctg	tat	cgg	gac	atg	gat	gtg	gtg	tca	1341
Arg	Asp	Gln	Pro	Phe	Thr	Ile	Leu	Tyr	Arg	Asp	Met	Asp	Val	Val	Ser	
	320						325				330					
gga	cgc	tcc	gtt	cct	gct	gac	atc	ttc	cag	atg	caa	gca	aca	acc	cga	1389
Gly	Arg	Ser	Val	Pro	Ala	Asp	Ile	Phe	Gln	Met	Gln	Ala	Thr	Thr	Arg	
335					340					345					350	
tac	cct	ggg	gcc	tat	tac	att	ttc	cag	atc	aaa	tct	ggc	aac	gag	ggg	1437
Tyr	Pro	Gly	Ala	Tyr	Tyr	Ile	Phe	Gln	Ile	Lys	Ser	Gly	Asn	Glu	Gly	
			355					360					365			
cga	gag	ttc	tat	atg	cgg	caa	aca	ggg	cct	atc	agt	gcc	acc	ctg	gtg	1485
Arg	Glu	Phe	Tyr	Met	Arg	Gln	Thr	Gly	Pro	Ile	Ser	Ala	Thr	Leu	Val	
			370					375					380			
atg	aca	cgc	ccc	atc	aaa	ggg	cct	cgg	gac	atc	cag	ctg	gac	ttg	gag	1533
Met	Thr	Arg	Pro	Ile	Lys	Gly	Pro	Arg	Asp	Ile	Gln	Leu	Asp	Leu	Glu	
		385					390					395				
atg	atc	act	gtc	aac	act	gtc	atc	aac	ttc	aga	ggc	agc	tcc	gtg	atc	1581
Met	Ile	Thr	Val	Asn	Thr	Val	Ile	Asn	Phe	Arg	Gly	Ser	Ser	Val	Ile	
	400					405					410					

cga ctg cgg ata tat gtg tgg cag tat ccg ttc tgagcctctg gctaaggcct 1634
 Arg Leu Arg Ile Tyr Val Ser Gln Tyr Pro Phe
 415 420 425

ctgacactgc ctttcaccag caccgagggg cgggaggaga aaggaaacca gcaagaatga 1694
 gagcgagaca gacattgcac ctttcctgct gaatatctcc tggggggcatc agcctagcat 1754
 cttgacccat atctgtacta ttgcagatgg tcaactctgaa ggacaccctg ccctcagttc 1814
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 cttcaaagcc ttccatttat ttccatcggt ttataaaaaa gaaaatagat tagatttgct 1934
 ggggtatgag tctcgaagg ttcaaaagac tgagtggctt gctctcacct cttcctctcc 1994
 ttctccatc tcttgctgca ttgctgcttt gcaaaagtcc tcatgggctc gtgggaaatg 2054
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 gaaatttttag ttgtctttta aatttgatg agtggttaac cttttcttat tcattttgag 2234
 gcttcttaaa gtggtagaat tctttccaaa ggctcagat acatgttatg ttcagtcttt 2294
 ccaacctcat cctttcctgc atcttagccc agtttttacg aagaccctt aatcatgctt 2354
 tnttaagagt ttttacccaa ctgcgttgga agacagaggt atccagactg attaaataat 2414
 tgaagaaaaa aaaaa 2429

<210> 8
 <211> 461
 <212> PRT
 <213> Mus musculus

<220>
 <221> misc_feature
 <223> Clone mouse A55b derived from Day 13 mouse embryonic heart

<400> 8

Met Gly Pro Arg Ser Phe Glu Pro Met His Ser Gly Leu Cys Arg Gln
 -35 -30 -25

Arg Arg Met Ile Leu Thr Val Thr Ile Leu Ala Leu Trp Leu Pro His
 -20 -15 -10 -5

Pro Gly Asn Ala Gln Gln Gln Cys Thr Asn Gly Phe Asp Leu Asp Arg
 -1 1 5 10

Gln Ser Gly Gln Cys Leu Asp Ile Asp Glu Cys Arg Thr Ile Pro Glu
15 20 25

Ala Cys Arg Gly Asp Met Met Cys Val Asn Gln Asn Gly Gly Tyr Leu
30 35 40

Cys Ile Pro Arg Thr Asn Pro Val Tyr Arg Gly Pro Tyr Ser Asn Pro
45 50 55 60

Tyr Ser Thr Ser Tyr Ser Gly Pro Tyr Pro Ala Ala Ala Pro Pro Val
65 70 75

Pro Ala Ser Asn Tyr Pro Thr Ile Ser Arg Pro Leu Val Cys Arg Phe
80 85 90

Gly Tyr Gln Met Asp Glu Gly Asn Gln Cys Val Asp Val Asp Glu Cys
95 100 105

Ala Thr Asp Ser His Gln Cys Asn Pro Thr Gln Ile Cys Ile Asn Thr
110 115 120

Glu Gly Gly Tyr Thr Cys Ser Cys Thr Asp Gly Tyr Trp Leu Leu Glu
125 130 135 140

Gly Gln Cys Leu Asp Ile Asp Glu Cys Arg Tyr Gly Tyr Cys Gln Gln
145 150 155

Leu Cys Ala Asn Val Pro Gly Ser Tyr Ser Cys Thr Cys Asn Pro Gly
160 165 170

Phe Thr Leu Asn Asp Asp Gly Arg Ser Cys Gln Asp Val Asn Glu Cys
175 180 185

Glu Thr Glu Asn Pro Cys Val Gln Thr Cys Val Asn Thr Tyr Gly Ser
190 195 200

Phe Ile Cys Arg Cys Asp Pro Gly Tyr Glu Leu Glu Glu Asp Gly Ile
205 210 215 220

His Cys Ser Asp Met Asp Glu Cys Ser Phe Ser Glu Phe Leu Cys Gln
225 230 235

His Glu Cys Val Asn Gln Pro Gly Ser Tyr Phe Cys Ser Cys Pro Pro
240 245 250

Gly Tyr Val Leu Leu Asp Asp Asn Arg Ser Cys Gln Asp Ile Asn Glu
255 260 265

Cys Glu His Arg Asn His Thr Cys Thr Ser Leu Gln Thr Cys Tyr Asn
270 275 280

Leu Gln Gly Gly Phe Lys Cys Ile Asp Pro Ile Ser Cys Glu Glu Pro
285 290 295 300

Tyr Leu Leu Ile Gly Glu Asn Arg Cys Met Cys Pro Ala Glu His Thr
305 310 315

Ser Cys Arg Asp Gln Pro Phe Thr Ile Leu Tyr Arg Asp Met Asp Val
320 325 330

Val Ser Gly Arg Ser Val Pro Ala Asp Ile Phe Gln Met Gln Ala Thr
335 340 345

Thr Arg Tyr Pro Gly Ala Tyr Tyr Ile Phe Gln Ile Lys Ser Gly Asn
350 355 360

Glu Gly Arg Glu Phe Tyr Met Arg Gln Thr Gly Pro Ile Ser Ala Thr
365 370 375 380

Leu Val Met Thr Arg Pro Ile Lys Gly Pro Arg Asp Ile Gln Leu Asp
385 390 395

Leu Glu Met Ile Thr Val Asn Thr Val Ile Asn Phe Arg Gly Ser Ser
400 405 410

Val Ile Arg Leu Arg Ile Tyr Val Ser Gln Tyr Pro Phe
415 420 425

<210> 9
<211> 423
<212> PRT
<213> Mus musculus

<400> 9

Gln Cys Thr Asn Gly Phe Asp Leu Asp Arg Gln Ser Gly Gln Cys Leu
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Asp Ile Asp Glu Cys Arg Thr Ile Pro Glu Ala Cys Arg Gly Asp Met
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Met Cys Val Asn Gln Asn Gly Gly Tyr Leu Cys Ile Pro Arg Thr Asn
35 40 45
Pro Val Tyr Arg Gly Pro Tyr Ser Asn Pro Tyr Ser Thr Ser Tyr Ser
50 55 60
Gly Pro Tyr Pro Ala Ala Ala Pro Pro Val Pro Ala Ser Asn Tyr Pro
65 70 75 80
Thr Ile Ser Arg Pro Leu Val Cys Arg Phe Gly Tyr Gln Met Asp Glu
85 90 95
Gly Asn Gln Cys Val Asp Val Asp Glu Cys Ala Thr Asp Ser His Gln
100 105 110
Cys Asn Pro Thr Gln Ile Cys Ile Asn Thr Glu Gly Gly Tyr Thr Cys
115 120 125
Ser Cys Thr Asp Gly Tyr Trp Leu Leu Glu Gly Gln Cys Leu Asp Ile
130 135 140
Asp Glu Cys Arg Tyr Gly Tyr Cys Gln Gln Leu Cys Ala Asn Val Pro
145 150 155 160
Gly Ser Tyr Ser Cys Thr Cys Asn Pro Gly Phe Thr Leu Asn Asp Asp
165 170 175
Gly Arg Ser Cys Gln Asp Val Asn Glu Cys Glu Thr Glu Asn Pro Cys
180 185 190
Val Gln Thr Cys Val Asn Thr Tyr Gly Ser Phe Ile Cys Arg Cys Asp
195 200 205
Pro Gly Tyr Glu Leu Glu Glu Asp Gly Ile His Cys Ser Asp Met Asp
210 215 220
Glu Cys Ser Phe Ser Glu Phe Leu Cys Gln His Glu Cys Val Asn Gln
225 230 235 240
Pro Gly Ser Tyr Phe Cys Ser Cys Pro Pro Gly Tyr Val Leu Leu Asp
245 250 255
Asp Asn Arg Ser Cys Gln Asp Ile Asn Glu Cys Glu His Arg Asn His
260 265 270
Thr Cys Thr Ser Leu Gln Thr Cys Tyr Asn Leu Gln Gly Gly Phe Lys
275 280 285

Cys Ile Asp Pro Ile Ser Cys Glu Glu Pro Tyr Leu Leu Ile Gly Glu
 290 295 300
 Asn Arg Cys Met Cys Pro Ala Glu His Thr Ser Cys Arg Asp Gln Pro
 305 310 315 320
 Phe Thr Ile Leu Tyr Arg Asp Met Asp Val Val Ser Gly Arg Ser Val
 325 330 335
 Pro Ala Asp Ile Phe Gln Met Gln Ala Thr Thr Arg Tyr Pro Gly Ala
 340 345 350
 Tyr Tyr Ile Phe Gln Ile Lys Ser Gly Asn Glu Gly Arg Glu Phe Tyr
 355 360 365
 Met Arg Gln Thr Gly Pro Ile Ser Ala Thr Leu Val Met Thr Arg Pro
 370 375 380
 Ile Lys Gly Pro Arg Asp Ile Gln Leu Asp Leu Glu Met Ile Thr Val
 385 390 395 400
 Asn Thr Val Ile Asn Phe Arg Gly Ser Ser Val Ile Arg Leu Arg Ile
 405 410 415
 Tyr Val Ser Gln Tyr Pro Phe
 420

<210> 10
 <211> 1269
 <212> DNA
 <213> Mus musculus

<400> 10
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 tatttgtgca tccctcgaac caaccagtg tatcgagggc cttactcaaa tccctactct 180
 acatcctact caggcccata cccagcagcg gcccaccag taccagcttc caactacccc 240
 acgatttcaa ggcctcttgt ctgccgcttt gggtatcaga tggatgaagg caaccagtgt 300
 gtggatgtgg acgagtgtgc aacagactca caccagtgc accctacca gatctgtatc 360
 aacactgaag gaggttacac ctgctcctgc accgatgggt actggcttct ggaagggcag 420
 tgccctagata ttgatgaatg tcgctatggt tactgccagc agctctgtgc aaatgttcca 480
 ggatcctatt cctgtacatg caaccctggt ttcaccctca acgacgatgg aaggtcttgc 540
 caagatgtga acgagtgcga aactgagaat cctgtgttcc agacctgtgt caacacctat 600
 ggctctttca tctgccgctg tgaccagga tatgaacttg aggaagatgg cattcactgc 660

agtgatatgg acgagtgcag cttctccgag ttcctctgtc aacacgagtg tgtgaaccag	720
ccgggctcat acttctgtct gtgccctcca ggctacgtcc tgttgatga taaccgaagc	780
tgccaggata tcaatgaatg tgagcaccga aaccacacgt gtacctact gcagacttgc	840
tacaatctac aagggggctt caaatgtatt gatcccatca gctgtgagga gccttatctg	900
ctgattggtg aaaaccgctg tatgtgtcct gctgagcaca ccagctgcag agaccagcca	960
ttcaccatcc tgtatcggga catggatgtg gtgtcaggac gtcctgttc tgctgacatc	1020
ttccagatgc aagcaacaac ccgataccct ggtgcctatt acattttcca gatcaaatct	1080
ggcaacgagg gtcgagagtt ctatatgcgg caaacagggc ctatcagtgc caccctggtg	1140
atgacacgcc ccatcaaagg gcctcgggac atccagctgg acttgagat gatcactgtc	1200
aacactgtca tcaacttcag aggcagctcc gtgatccgac tgcggatata tgtgtcgcag	1260
tatccgttc	1269

<210> 11
 <211> 35
 <212> DNA
 <213> Artificial Sequence

<220>
 <223> Description of Artificial Sequence: Primer

<220>
 <221> misc_feature
 <223> "n" may be a, c, g or t

<400> 11	
cgattgaatt ctagacctgc ctcgagnnnn nnnnn	35

<210> 12
 <211> 27
 <212> DNA
 <213> Artificial Sequence

<220>
 <223> Description of Artificial Sequence: A55 R1 Primer

<400> 12	
cgtttgtgca ctgctgctgt gcattcc	27